EARLY BUTTERFLIES AND MOTHS IN THE ISLE OF WIGHT DURING 1997

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NATIONALLY, 1996/1997 was the driest two-year period since records began over two-hundred years ago. During the twelve months since April 1996, only November 1996 and February 1997 have recorded above average monthly rainfall. At Ryde up to 108mm (4.25 inches) of rain fell during February, about 70% more than average, boosting the low underground sources as well as reservoir levels and river flows. It was the warmest March for sixty years with the mean maximum temperature of 13°C (55.6°F) which was the highest since 1938 and was 3.4°C (5.6°F) above the average. The highest day temperature was 18.1°C (61°F) on 15 March and the lowest night temperature was 2°C (35.6°F) on 31 March. The total sunshine of 129 hours was almost exactly average and it was a dry month with under an inch of rainfall. April was the sunniest on the island since records began in 1918. With 248.8 hours of sunshine, the month just beat the previous April record of 240.3 hours in April 1990. The sunniest April day was the 30th with 13.8 hours of sunshine, the previous highest being 13.7 hours in 1966 and 1959. The month was also warmer than usual and the highest temperature of 19.1°C (66.4°F) was recorded as early as the 10th. With only 14.2mm (0.56 inches) of rain compared to the 46.2°C (1.82 inches) longterm average for April, the drought, which started at the beginning of March continued. There was 12.7mm (0.5 inches) of rain on 3 March and between then and 25 April there were seven days on which very small amounts of rain (less than 0.5mm (0.02 inches)) fell.

The exceptionally warm and sunny months of March and April caused some very early emergences of many of our spring butterflies and moths, which may be compared to the years 1989, 1990, 1993 and 1995 when there were also forward springs. Over the last ten years there has been only one appreciably cold winter, in 1991, and there seems to be good evidence of the effects of global warming over this last decade with this feature of mild winters and early springs being the norm.

Amongst the butterflies that emerge in the spring the Holly Blue *Celastrina argiolus* (L.) was seen as early as 20 March compared to 28 March in 1989 and 29 March in 1990. On the same day a very early Green-veined White *Pieris napi* (L.) was observed at Arreton. An Orange-tip *Anthocharis cardamines* (L.) was seen on 27 March at Gurnard. During April the Green Hairstreak *Callophrys rubi* (L.) was noted in the chalk-pit at Afton Down on 9 April which compares to 12 April 1995. The Grizzled Skipper *Pyrgus malvae* (L.) was observed at the same locality on 10 April compared to 14 April in 1995. An exceptionally early Duke of Burgundy Fritillary *Hamearis lucina* (L.) was seen on Tolt Down, Gatcombe on 16 April. The Small Heath *Coenonympha pamphilus* (L.) was recorded on Brading Down on 21 April. The Small Blue *Cupido minimus* (Fuess.) and Brown Argus *Aricia agestis* (D.&S.) were seen on Afton Down on 27 April and the former species was observed at the same locality on 29 April in 1990. The Glanville Fritillary *Melitaea cinxia* (L.)

was also noted on 30 April at Wheelers Bay together with the Common Blue *Polyommatus icarus* (Rott.).

On the mainland there were some even more incredibly early examples of early butterflies, the details of which are given below:

Speckled Wood *Pararge aegeria* (L.) – 6 March, Somerset.

Green Hairstreak Callophrys rubi (L.) – 27 March, Suffolk.

Grizzled Skipper *Pyrgus malvae* (L.) – 1 April, Sussex.

Pearl-bordered Fritillary Boloria euphrosyne (L.) – 11 April, Dartmoor.

Dingy Skipper Erynnis tages (L.) – 12 April, Sussex.

I now give below a list of early emergent spring species of butterflies seen on the island during March and April:

Date March	Species	Locality
20	Holly Blue Celestrina argiolus (L.) Green-veined White Pieris napi (L.)	Freshwater and Gurnard Arreton
27	Small White Pieris rapae (L.) Speckled Wood <i>Pararge aegeria</i> (L.) Orange-tip <i>Anthocharis cardamines</i> (L.)	Binstead and Brading Freshwater Gurnard
April		
9	Small Copper <i>Lycaena phlaeas</i> (L.) Green Hairstreak <i>Callophrys rubi</i> (L.)	Newtown Afton Down
10	Grizzled Skipper <i>Pyrgus malvae</i> (L.) Large White <i>Pieris brassicae</i> (L.)	Afton Down Freshwater
16	Duke of Burgundy Hamaeris lucina (L.)	Tolt Down, Gatcombe
21	Small Heath Coenonympha pamphilus (L.)	Brading Down
22	Dingy Skipper Erynnis tages (L.)	Brading
27	Small Blue <i>Cupido minimus</i> (Fuessl.) Brown Argus <i>Aricia agestis</i> (D.&S.) Wall Brown <i>Lasiommata megera</i> (L.)	Afton Down Afton Down Binstead
29	Pearl-bordered Fritillary Boloria selene (L.)	Parkhurst and Walters Copse
30	Glanville Fritillary <i>Melitaea cinxia</i> (L.) Common Blue <i>Polyommatus icarus</i> (Rott.)	Wheelers Bay Brading and Wheelers Bay

Amongst the migrant butterflies the first Red Admiral *Vanessa atalanta* (L.) was seen at Gurnard in the Solent on 16 January and the first Painted Lady *Cynthia cardui* (L.) was recorded on 27 April on Afton Down.

In early March warm southerly winds blew up from the Azores causing a considerable migration of moths. I recorded the rare North African Pyralid *Euchromius ocellea* (Haw.) on 7 March at Freshwater and a second was recorded at

Christchurch on the mainland on the same night. I recorded the White-speck Wainscot *Mythimna unipuncta* (Haw.) on 9 March. the Pearly Underwing *Peridroma saucia* (Hb.) also on 9 March; the Silver Y *Autographa gamma* (L.) on 11 March and I observed a Hummingbird Hawkmoth *Macroglossum stellatarum* (L.) feeding on Elephant's Tongue by day on 20 March. Nearly two dozen Dark Sword Grass *Agrotis ipsilon* (Hufn.) were recorded at this time with the first being taken at Binstead on 3 March.

Brian Warne and I made several trips to Whitefield Woods near Ryde during March to see if we could capture the Orange Underwing *Archieris parthenias* (L.) and on 21 March we caught six examples during a warm and sunny afternoon. When I had set mine I noticed that one was in fact the Light Orange Underwing *Archieris notha* (Hb.) which happened to be the first record for over fifty years on the island. There is a stand of Aspen in these woods so both species appear to be present.

Amongst the species which were several weeks early were several Prominents. The Swallow Prominent *Pheosia tremula* (Cl.) was recorded at Freshwater on 3 April. The Lesser Swallow Prominent *P. gnoma* (Fabr.) was taken on 14 April which compares to 12 April in 1995 and the very early date of 31 March in 1990. The Pebble Prominent *Eligmodonta ziczac* (L.) was noted on 11 April (24 April in 1995) and the Iron Prominent *Notodonta dromedarius* (L.) on 21 April (26 April in 1995). The Red Twin-spot Carpet *Xanthorhoe spadicearia* (D.&S.) was recorded at Binstead on 21 April (27 April in 1995) and the Mullein *Cucullia verbasci* (L.) was seen on 12 April. A very early Ruby Tiger *Phragmatobia fuliginosa* (L.) was taken at Arreton on 27 March (12 April in 1995). Compared to 1995 this year was about a week earlier but there were even earlier records in 1990 which included the Brimstone *Opisthograptis luteolata* (L.) on 31 March (9 April in 1997).

I now give below details of the more interesting species of moths that were recorded on the island during March and April 1997.

Date	Species	Locality
March		
9	White-speck Wainscot Mythimna unipuncta Haw.)	Freshwater
11	Silver Y Autographa gamma (L.)	Freshwater
12	Square Spot Paradarisa consonaria (Hb.)	Binstead
14	Orange Underwing Archieris parthenias (L.) Powdered Quaker Orthosia gracilis (D.&S.)	Whitefield Woods Freshwater
16	Engrailed Ectropis bistortata (Goeze)	Binstead
20	Humming-bird Hawk Macroglossum Stellatarum (L.)	Freshwater
21	Light Orange Underwing Archieris notha (Hb.)	Whitefield Woods
27	Red-green Carpet Chloroclysta siterata (Hufn.)	Binstead
	Ruby Tiger Phragmatobia fuliginosa (L.)	Arreton
29	Purple Thorn Selenia tetralunaria (Hufn.)	Freshwater and Binstead

April		
3	Swallow Prominent <i>Pheosia tremula</i> (Cl.) Nut-tree Tuffet <i>Colocasia coryli</i> (L.)	Freshwater Binstead
9	Brimstone Opisthograptis luteolata (L.)	Binstead
11	Pebble Prominent Eligmodonta ziczac (L.)	Freshwater
12	Mullein Cucullia verbasci (L.)	Freshwater
14	Scorched Carpet Ligdia adustata (D.&S.) Cinnabar Tyria jacobaeae (L.) Lesser Swallow Prominent Pheosia gnoma (Fabr.) Pale Prominent Pterostoma palpina (Cl.)	Binstead Binstead Binstead
21	Iron Prominent Notodonta dromedarius (L.) Red Twin-spot Carpet Xanthorhoe spadicearia (D.&S.)	Binstead Binstead
24	Grey Dagger Acronicta psi (L.)	Freshwater
25	Pale Tussock Calliteara pudibunda (L.) Maidens Blush Cyclophora punctaria (L.) Bright-line Brown-eye Laconobia oleracea (L.)	Binstead Binstead Freshwater
26	Poplar Hawk <i>Laothoe populi</i> (L.) Peppered Moth <i>Biston betularia</i> (L.)	Binstead Binstead
27	Cabbage Mamestra brassicae (L.)	Freshwater
29	Oak Hook-tip Drepana binaria (Hufn.)	Binstead

It will be interesting to see if mild winters and early springs are a feature during the next ten years. If so it may add greater weight to the theory of global warming.

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